

ABSTRACT OF THE DISCLOSURE

In a multi-mode scheduler including a  $N \times kM$  scheduler for adjusting data transmission between  $N$ -pieces of input interface sections and  $kM$ -pieces of output interface sections, the multi-mode scheduler,  $k$ -pieces of  $N \times M$  schedulers to be the  $N \times kM$  scheduler, and  $(k-1)$ -pieces of selection circuits for switching allocated output port information input from an outside of the  $N \times kM$  scheduler and information from a  $N \times M$  scheduler at front step, so as to be input to the  $N \times M$  scheduler as allocated output port information, and two operations are set freely with a switching operation of the selection circuits. As a result, it is possible to provide a general scheduler.